

## **CATEGORICAL EXCLUSION WORKSHEET: RESOURCE CONSIDERATIONS**

### **Fire/Fuels/Air Quality**

Crane Point Vegetation Restoration

Palouse Ranger District

Nez Perce/Clearwater National Forest

#### **Description of Purpose & Need for the Proposed Action**

The general purpose of the project is to improve overall forest health and ecological function toward desired future conditions as identified in the Forest Plan. The primary objectives of the Crane Point project are:

- Decrease current levels of insect and disease mortality to improve forest health and resiliency (maximizing old growth and large trees to the extent possible).
- Increase the amount of western white pine, western larch, and ponderosa pine and in turn decrease dominance of root-disease intolerant species such as Douglas-fir and grand fir.
- Reduce hazardous fuels in Wildland-Urban Interface
- Harvest wood products to sustain local and regional economies.

The Crane Point project area is located entirely within county designated rural Wildland Urban Interface (WUI) areas for Latah and Benewah counties. These areas have been identified by each of the county's respective Community Wildland Fire Protection Plans (CWPPs). Current fuel conditions have been generated through fire exclusions, timber harvest, and changes in dominant timber species. Fire Regime Condition Class (FRCC) maps show a split of 58% Condition Class 1 (Low Departure), 40% Condition Class 2 (Moderate Departure), and 2% Condition Class 3 (Severely Departure) within the project area (Table 1; Figure 1). The proposed commercial and non-commercial treatments are needed to trend the areas identified as Condition Class 2 and Condition Class 3 to condition Class 1 in order to reduce potential fire intensity and severity within the Wildland Urban Interface.

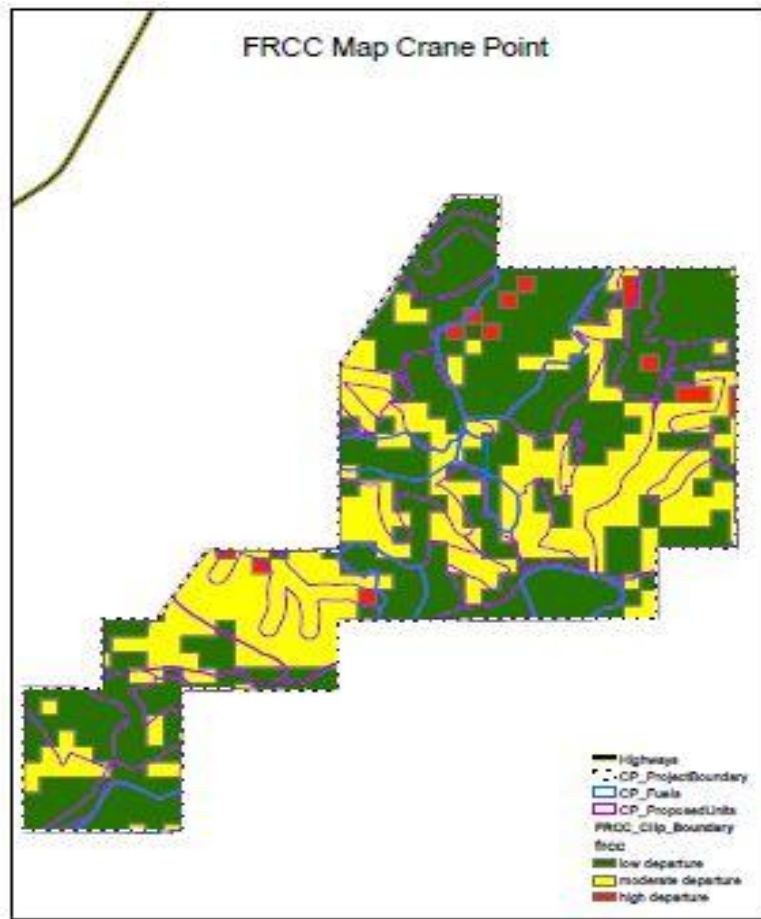
As an overlay of the FRCC for the project area, an additional assessment (WFAT ClearNez18) of the potential burn severity has been analyzed for the Nez Perce-Clearwater National Forests. The burn severity map takes into account the fire type and flame length possible, adding the codes related to these respective elements to assign a Burn Severity Category (Table 2; Figure 2). Calculations show 89% of the project area is classified being potential high burn severity, 1% being moderate severity, and 10% being low severity. [Table 1, as originally provided, was confusing so I split them into two tables.]

Table 1: FRCC Percent in Crane Point Project Area

<b>Fire Regime Condition Class</b>	<b>Percent</b>
FRCC1 Low Departure From Historic	58

Fire Regime Condition Class	Percent
FRCC2 Moderate Departure From Historic	40
FRCC3 Severe Departure From Historic	2

Figure 1: Fire Regime Condition Class Map\*

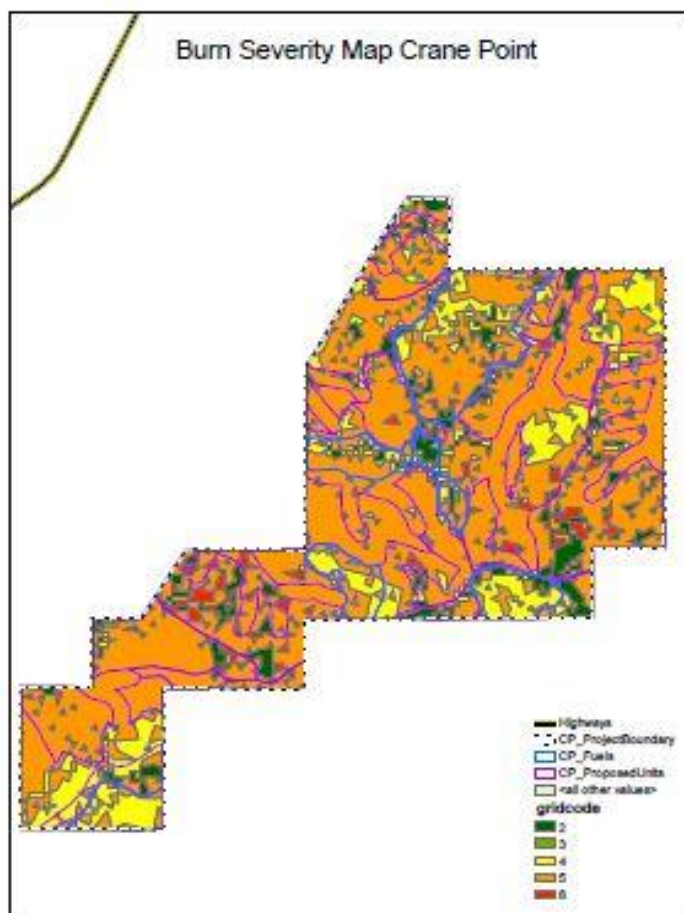


\* FRCC1 = Green, FRCC2 = Yellow, FRCC3 = Red

Table 2: Burn Severity Percent in Crane Point Project Area

Burn Severity Category	Percent
Low	10
Moderate	1
High	89

Figure 2: Potential Burn Severity Map\*



\* Low = Dark Green, Moderate = Light Green, High= Yellow, Orange, & Red

It is notable how much of the project area from the FRCC map shows a low departure from historic fire regimes (FRCC 1) within the project area. This is attributed to the active forest management which has effectively mimicked historic wildfire cycle. A general limitation when analyzing FRCC is that any decision based on the data should be supported with field verification, especially at scales finer than 1:100,000. The expected accuracy does not warrant their use for analyses of areas smaller than about 10,000. The Crane Point project area is near the 24,000 scale. When incorporated with the Burn Severity data and on-the-ground reconnaissance, the need for fuels treatment however is evident. Several of the non-commercial fuels treatment units occur within plantations from prior management. Continuous fuels exist in these plantations, from the ground surface to the crowns, due to the presence of brush ingrowth competing with trees, and natural regeneration of shade tolerant conifers. As these plantations and previous treatments continue to grow so does the potential severity of a wildfire with no treatment. Within proposed harvest units, fuels generated from these activities will be treated to reduce potential fire severity effects should a fire occur on the landscape.

The result of these treatments would provide a more fire resilient environment while continuing to bring the condition of the vegetation cover type closer to what occurred on the landscape historically. In the absence of treatment the existing “high” burn severity condition will continue to persist and amplify, putting private property and wildfire suppression resources at greater risk due to greater potential fire behavior.

### **Description of the Proposed Action**

Vegetation treatments include 701 acres of commercial timber harvest (622 acres of regeneration and 79 acres of commercial thinning), 20 acres of Old Growth enhancement, and 241 acres of non-commercial fuels treatment (see Figure 1; Table 1, p. 4). Approximately 80% of commercial timber harvest work will be done using skyline logging systems and 20% using ground-based systems (see standard design criteria for specific information). Timber will likely be hauled via Forest Service Roads (FSR) 1273 and 1274 plus associated spur roads.

The following will be conducted in support of the above:

- Approximately four (4) miles of temporary roads would be constructed to facilitate vegetation treatments and would be decommissioned no later than three (3) years after the project is completed (see Figure 3).
- Approximately 16 miles of Forest Service system road will be maintained, reconditioned, or improved for log hauling. Work includes brushing, road blading, ditch and catch basin excavation, culvert replacement (FSR 1274) and aggregate surfacing placement. Spur roads off of FSRs 1273 and 1274 are closed seasonally, from October 1 – June 15.

After regeneration harvest, the Forest Service will reduce slash generated from harvest to prepare sites for planting (regeneration) within three (3) years. Regeneration includes site-preparation (site-prep), reforestation of blister-rust resistant western white pine, western larch, and ponderosa pine, and animal damage control for pocket gophers, where present. Site prep could include:

- Slashing of sub-merchantable trees or brush
- Prescribed burning (broadcast burning, underburning, jackpot burning)
- Mechanical or hand piling and burning of slash
- Mastication of activity fuels, sub-merchantable trees or brush
- Biomass removal
- Non-commercial thinning of lower branches to reduce ladder fuel
- Leave tree preparation and pruning – to protect the leave trees during burning activities

Before and after planting, treatment for control of pocket gophers will occur where necessary. Pocket gopher populations increase post-harvest with a flush in vegetation such as forbs, grasses, shrubs and small trees whose roots supply a food source. Gophers damage young trees by stem girdling and clipping, root pruning, and root exposure caused by burrowing, all of which can result in a failed plantation.

Surveys would be conducted after the first and third growing seasons to monitor the survival and



The below is not a 'Description of the Proposed Action' but a 'Direct and Indirect Effects' analysis of the Proposed Action. Per the CE Worksheet instructions the D/I Effects analysis is not needed for this resource and therefore the analysis should be deleted.

### ***Required Design Features***

The following design features are required to ensure compliance with the regulatory framework for this resource and/or to reduce the risk of adverse impacts to this resource. A description is provided as to when, where and how the design feature should be applied and/or what conditions would trigger the need to apply the design feature.

1. AQ-2: Coordinate with the North Idaho/Montana Airshed Group when prescribed burns are scheduled (minimum 24 hour notice) to ensure compliance with the Clean Air Act.

***Anticipated Effectiveness:*** Excellent effectiveness. The Airshed Group has an excellent track record of using self-regulation to ensure prescribed burning can still be utilized as a tool while maintaining Air Quality Standards

### **Cause-Effect Relationship**

The information used in this analysis is a combination of available data, research material, literature, field reviews, modeling, and assessments. A fuels field review of the area was conducted in 2017 and 2018. This review consisted of visiting proposed non-commercial units and some stands in the project area, performing walkthrough exams, and making recommendations for appropriate treatments based on observed stand conditions, in cooperation with silviculture. Database queries of Fire Regimes, Fire Regime Condition Class, Burn Severity Codes, Landfire, Benewah County Wildland-Urban Interface Wildfire Mitigation Plan 2012, Latah County Multi-Hazard Mitigation Plan 2011, Latah County All Hazards Mitigation Plan 2007, Behave Plus 6.0.0, and Wildland Fire Assessment Tool were also used to assess the burn severity, current and historic fire regimes of the project area.

Predictions of fire behavior, post-treatment, indicate that treatments would be highly effective at reducing a fire's Rate of Spread (ROS) and Flame Length (FL) to the point where all fires could be suppressed by hand using direct attack tactics. The potential for large fire growth (Estimated Fire Size given 2 hour lapse) was also shown to be drastically reduced.

The proposed action would have a beneficial impact to the condition of the fuels within the project area:

- Stands in poor health and condition would be harvested and the resulting fuels treated.
- The non-commercial fuels units treatments would increase the units' resiliency to wildfire within the project.
- The proposed treatments would trend the project area towards a low departure from its historic fire regime.
- Fuels treatments within the Wildland Urban Interface designated by the Latah and the Benewah County Wildfire Protection Plans would have been achieved.

Overall the effects of the proposed project include reducing potential fire behavior, facilitating fire suppression activities, and increasing the likelihood of suppression success within and adjacent to county-identified Wildland-Urban Interface (WUI) areas.

### **Regulatory Framework**

The proposed action has been reviewed and is determined to be in compliance with the management framework applicable to this resource. The laws, regulations, policies and Forest Plan direction applicable to this project and this resource are as follows:

#### Forest Plan Direction

Management Area E-1 (III-59)

Goals: a. Limit the size of individual wildfires.

- A. To one acre or less in immature timber stands especially plantations, thinned areas, etc.
- B. To 40 acres or less in mature timber.
- C. To 500 acres or less in brush fields.

The proposed action treats natural fuels and activity generated fuels within the proposed units. As a result of the treatments the potential fire behavior has been reduced allowing a greater chance of suppressing the size of individual wildfires to the sizes related to the different fuels types in goals A-C from the forest plan.

#### Brush Disposal Act

The Brush Disposal Act of August 11, 1916, as amended (16 U.S.C. 490) and the Granger-Thye Act of April 24, 1950 (16 U.S.C. 490, 504a, 555, 557, 571c, 572, 579, 580c-l, 581i-l), require that a purchaser of National Forest timber make deposits to the United States for the estimated cost of disposing of brush and other debris resulting from the purchaser's cutting operations.

A BD plan will be implemented for commercial activities associated with harvest. Through this plan deposits will be made by the purchaser to the Forest Service for treatment of hazardous fuels that are generated through harvest activities. Purchaser requirements will also be identified within the BD plan. Requirements will be for activities the purchaser must complete. Through the deposits and purchaser requirements the disposing of brush and other debris resulting from the purchaser's cutting operations will have been treated.

#### Clean Air Act

The Clean Air Act, passed in 1963 and amended in 1977, 1990, 1999 (42 USC 7401-7626), is the primary legal authority governing air quality management. This Act provides the framework for national, state, and local efforts to protect air quality. The Montana/Idaho State Airshed Group was formed in response to the Idaho State Implementation Plan. This group, which is composed of members who conduct a "major" amount of prescribed burning and the regulatory and health agencies that regulate this burning, cooperates with both Idaho and Montana Departments of Environmental Quality to coordinate

all prescribed burning activities, provide smoke forecasting, and establish air quality restrictions for Group members.

The intent of the Airshed Group is to minimize or prevent smoke impacts and ensure compliance with the National Ambient Air Quality Standards (NAAQS) issued by the Environmental Protection Agency (EPA), the federal agency charged with enforcing the Clean Air Act while using fire to accomplish land management objectives and/or fuel hazard reduction. The USDA Forest Service, including the Palouse Ranger District, is a member of this Airshed Group through the North Idaho Memorandum of Agreement and adheres to the North Idaho Smoke Management Plan. The Crane Point project area is in North Idaho Airshed Unit 12A. All post-harvest site preparation and fuel reduction treatments would be conducted according to the requirements of the Montana/North Idaho Smoke Management Unit guidelines and would limit smoke accumulations to legal, acceptable limits.

#### Healthy Forests Restoration Act

The Healthy Forests Restoration Act of 2003 (P.L. 108-148), (HFRA, 2003) contains a variety of provisions to address hazardous fuel reduction and forest restoration projects on specific types of Federal land that are at risk of wildland fire and/or insect and disease epidemics. The HFRA helps all landowners and managers restore healthy forest and rangeland conditions on those lands, regardless of ownership.

The project area is designated as a “priority landscape” for treatment under Section 602 of the Healthy Forest Restoration Act (HFRA) of 2003, as added by section 9204 of the Agricultural Act of 2014 (herein, Farm Bill). According to the National Insect & Disease map, 25% or more of the current forested area is at risk for mortality. Under HFRA section 203, an insect and disease project may be categorically excluded from documentation in an environmental assessment or environmental impact statement and exempt from pre-decisional objections. The Forest Service determined the Crane Point project fits within the authority of the Farm Bill Categorical Exclusion (CE) and plans to document the actions and considerations for the project accordingly. See Appendix A for more information on the requirements of the HFRA authority.

#### **Extraordinary Circumstances**

No extraordinary circumstances need to be considered for fire, fuels, and air quality resources.

Alan Carlson, AFMO Fuels

October 31, 2018

#### **Literature Cited:**

Benewah County Wildland-Urban Interface Wildfire Mitigation Plan September 25, 2012

Latah County Multi-Hazard Mitigation Plan 2011

Latah County All Hazards Mitigation Plan 2007



*Crane Point Project Fire/Fuels/Air Quality Report*

Behave Plus 6.0.0

Wildland Fire Assessment Tool, WFAT

Landfire

Clean Air Act, 1963, 1977, 1990, 1999 (42 USC 7401-7626)

Clearwater National Forest Plan 1987

Healthy Forests Restoration Act of 2003 (P.L. 108-148) (HFRA, 2003)

Montana/Idaho Airshed Group Operating Guide (2010)